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APPLICATION NO. FILING DATE FIRST NAMED INVENTOR ATTORNEY DOCKET NO. CONFIRMATION NO. 10/540,556 12/13/2005 Sushil K Dubey 4062-167 5359 7590 05/03/2007 **EXAMINER** NIXON & VANDERHYE, PC 901 NORTH GLEBE ROAD, 11TH FLOOR DAVIS, BRIAN J ARLINGTON, VA 22203 **ART UNIT** PAPER NUMBER 1621 MAIL DATE **DELIVERY MODE** 05/03/2007 **PAPER**

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

	Application No	D.	Applicant(s)	
	10/540,556		DUBEY ET AL.	
Office Action Summary	Examiner		Art Unit	
	Brian J. Davis		1621	
The MAILING DATE of this communication ap Period for Reply	pears on the cov	er sheet with the co	orrespondence address	
A SHORTENED STATUTORY PERIOD FOR REPL WHICHEVER IS LONGER, FROM THE MAILING D - Extensions of time may be available under the provisions of 37 CFR 1.1 after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory period - Failure to reply within the set or extended period for reply will, by statute Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	DATE OF THIS (136(a). In no event, ho will apply and will expite, cause the application	COMMUNICATION owever, may a reply be time re SIX (6) MONTHS from the to become ABANDONED	ely filed he mailing date of this communication. (35 U.S.C. § 133).	
Status				
1) Responsive to communication(s) filed on	<u>_</u> .			
2a) This action is FINAL . 2b) ⊠ This	This action is FINAL . 2b)⊠ This action is non-final.			
3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is				
closed in accordance with the practice under	Ex parte Quayle	, 1935 C.D. 11, 45	3 O.G. 213.	
Disposition of Claims				
4) ⊠ Claim(s) 1-11 is/are pending in the application 4a) Of the above claim(s) is/are withdra 5) □ Claim(s) is/are allowed. 6) ⊠ Claim(s) 1-11 is/are rejected. 7) ⊠ Claim(s) 1-11 is/are objected to. 8) □ Claim(s) are subject to restriction and/or	awn from conside			
Application Papers				
9) The specification is objected to by the Examine 10) The drawing(s) filed on is/are: a) acc Applicant may not request that any objection to the Replacement drawing sheet(s) including the correct 11) The oath or declaration is objected to by the E	cepted or b) or cepted or b) or cepted or b) or cepted o	ld in abeyance. See the drawing(s) is obje	37 CFR 1.85(a). ected to. See 37 CFR 1.121(d).	
Priority under 35 U.S.C. § 119				
 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of: 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No. 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received. 				
Attachment(s)	-	7		
1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)	4) <u>L</u>	Interview Summary (Paper No(s)/Mail Da		
3) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date 6/24/05	5) [6) [Notice of Informal Pa		

DETAILED ACTION

Information Disclosure Statement

The lined-through entries of the 6/24/05 IDS fail to comply with 37 CFR 1.98(a)(2), which requires a legible copy of each cited foreign patent document; each non-patent literature publication or that portion which caused it to be listed; and all other information or that portion which caused it to be listed. The information referred to therein has, therefore, not been considered.

Specification

The disclosure is objected to because of the following informalities: the disclosure contains numerous instances of non-standard (or informal) English grammar as well as obvious spelling errors, for instance, page 2, line 11: "It is evident from [the] above that [al]though [the] prior art looks conceptually very good, *but* it is very cumbersome & time consuming." Additionally, as a matter of style, the substitution of the & symbol for the word *and* is an informal usage and should be avoided. Appropriate correction is required.

Claim Objections

Claims 1-11 are objected to because of the following informalities: as was noted above for the specification, the claims also contain numerous instances of non-standard English grammar as well as obvious spelling errors, for instance, in claim 1: "...a

suitable disaster[e]omeric salt[s]...solubility properties [are] exploited...temperature range [to] obtain [the] desired...". Analysis of the remaining claims is similar. Also, as above, with particular reference to claim 7, substitution of the & symbol for the word and is an informal usage and should be avoided. Appropriate correction is required.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claim 1 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. It is unclear how *resolving* [emphasis added] (R,S)-5-(2-aminopropyl)-2-methoxybenzenesulfonamide with tartaric acid forms a *mixture* of diastereomeric salts. That is, resolution, by definition, should separate such a mixture, not yield one. The term "suitable" is indefinite because it is undefined. Likewise, the phrase "such as" renders the claim indefinite because it is unclear whether the limitations following the phrase are part of the claimed invention. See MPEP § 2173.05(d). Use of this phase is particularly confusing in the instant claim since the full phrase ("...such as herein (before) described...") appears to refer to the specification, and it is settled case law that references to the specification are improper except in rare instances. *Ex parte Fressola*, 27 USPQ 2d 1608 (USPTO Bd. of App. & Int. 1993). The exact nature of the steps of the process are also unclear due to the

reference made to the [emphasis added] polar and alcoholic solvents at the end of the claim text - when no prior recitation or reference exists to such solvents.

Claim 3 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. The exact meanings of the term "coupled" and the phrase "varying ratios" are unclear because they are undefined. Likewise, the phrase "such as" or the word "like" renders the claim indefinite because it is unclear whether the limitations following the phrase are part of the claimed invention. See MPEP § 2173.05(d).

Claim 4 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. A broad range or limitation together with a narrow range or limitation that falls within the broad range or limitation (in the same claim) is considered indefinite, since the resulting claim does not clearly set forth the metes and bounds of the patent protection desired. See MPEP § 2173.05(c). Note the explanation given by the Board of Patent Appeals and Interferences in *Ex parte Wu*, 10 USPQ2d 2031, 2033 (Bd. Pat. App. & Inter. 1989), as to where broad language is followed by "such as" and then narrow language. The Board stated that this can render a claim indefinite by raising a question or doubt as to whether the feature introduced by such language is (a) merely exemplary of the remainder of the claim, and therefore not required, or (b) a required feature of the claims. Note also, for example, the decisions of *Ex parte Steigewald*, 131 USPQ 74 (Bd. App. 1961); *Ex parte Hall*, 83 USPQ 38 (Bd. App. 1948);

and *Ex parte Hasche*, 86 USPQ 481 (Bd. App. 1949). In the present instance, the claim implicitly recites the broad recitation "all temperatures," and the claim also recites "preferably...at...60-65°C) which is the narrower statement of the range/limitation.

Claims 8-10 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. There is insufficient antecedent basis of for the limitations "first stage operations," "second stage operations," and "second stage mother liquor." The examiner respectfully suggests that these claims should properly depend from claim 3. In addition, the exact meaning of the term "operations" is unclear because it is undefined.

Claim 11 is rejected under 35 U.S.C. 112, second paragraph, as being incomplete for omitting essential steps, such omission amounting to a gap between the steps. See MPEP § 2172.01. The omitted steps are: the steps of the process whereby racemic (R,S)-5-(2-amimopropyl)-2-methoxybenzenesulfonamide is prepared from 5-acetonyl-2-methoxybenzenesulfonamide. A claim referring to the specification ("...as shown in scheme: 2...") is improper except in rare instances. *Ex parte Fressola*, 27 USPQ 2d 1608 (USPTO Bd. of App. & Int. 1993). The process is also unclear because although the claim refers to the preparation of racemic (R,S)-5-(2-amimopropyl)-2-methoxybenzenesulfonamide, scheme 2 clearly is a method for preparing one enantiomer in particular – not a racemic mixture.

The remaining claims are also rejected under 35 USC 112, second paragraph, as claims which depend from indefinite claims are also indefinite. *Ex parte Cordova*, 10 USPQ 2d 1949, 1952 (PTO Bd. App. 1989).

Allowable Subject Matter

The subject matter of claims 1-10 would be allowable once the objections and 112 rejections outlined above have been overcome. The following is a statement of reasons for the indication of allowable subject matter:

The closest prior art appears to be EP 257787, cited by applicant in the IDS, which teaches a process for the preparation of (R)-(-)-5-(2-aminopropyl)-2-methoxybenzenesulfonamide by reacting 5-acetonyl-2-methoxybezenesulfonamide with an optically active benzylic amine. The resulting compound is then resolved and debenzylated to yield the desired product (page 6, line 6). The cited prior art neither teaches nor suggests the instant resolution process starting from racemic 5-(2-aminopropyl)-2-methoxybenzenesulfonamide and its resolution using tartaric acid.

At best, it might have been obvious to try resolving the racemic mixture (as opposed to a mixture of its derivative) using a simple optically active acid such as tartaric acid, however, an 'obvious to try' standard is impermissible in two situations: 1) where the prior art gives no indication as to which of numerous parameters are critical, or gives no indication as to which of many possible choices is likely to be successful; and 2) where the prior art gives only general guidance with respect to the form of the invention but not how to achieve it new areas of technology or in fields of

experimentation which are only seemingly promising. *In re O'Farrell*, 853 F2d 894, 7 USPQ 2d 1673, 1681 (Fed. Cir. 1988). In the instant case, 1 above applies.

The cited prior art neither teaches nor suggests the instant process. Nor would it have been obvious to one of ordinary skill in the art at the time of the invention to modify the teachings of the prior art in order to arrive at those of the instant invention. There is no motivation to do so.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Brian J. Davis whose telephone number is 571-272-0638. The examiner can normally be reached on M-F 8:30-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Thurman K. Page can be reached on 571-272-0602. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Art Unit: 1621

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

PRIMAR Brian L Davis

Brian J. Davis April 29, 2007